

(19) World Intellectual Property  
Organization  
International Bureau



(43) International Publication Date  
21 May 2004 (21.05.2004)

PCT

(10) International Publication Number  
**WO 2004/042220 A3**

(51) International Patent Classification<sup>7</sup>: **F16K 11/085**

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(21) International Application Number:

PCT/US2003/034379

(22) International Filing Date: 29 October 2003 (29.10.2003)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:

60/422,382 30 October 2002 (30.10.2002) US

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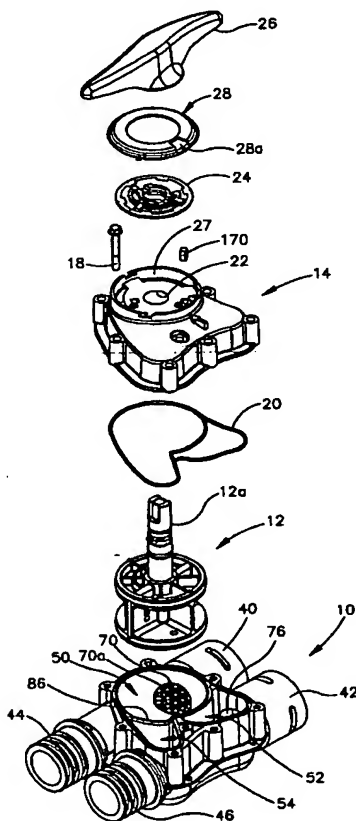
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(81) Designated States (*national*): AE, AG, AL, AM, AT, AU,  
AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU,  
CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE,  
GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR,  
KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK,  
MN, MW, MX, MZ, NI, NO, NZ, OM, PG, PH, PL, PT,  
RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR,  
TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

(84) Designated States (*regional*): ARIPO patent (GH, GM,  
KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW),  
Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM),  
European patent (AT, BE, BG, CH, CY, CZ, DE, DK, EE,  
ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO,  
SE, SI, SK, TR), OAPI patent (BF, BJ, CF, CG, CI, CM,  
GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

[Continued on next page]

(54) Title: BYPASS VALVE



(57) Abstract: A control valve usable as a bypass/diverter valve for controlling the flow of fluid from a source to a fluid treatment device or other water handling appliance, such as a water softener. The valve has a housing that includes first and second inlet/outlet fittings and first and second fluid transfer fittings and defines a valve chamber in fluid communication with the fittings. A valve member having a valving portion is rotatably received within the valve chamber. The valving portion includes a circular base and a disc member spaced above the circular base with a diametral wall extending therebetween which, together define a first fluid flow path through the valve when the valving portion is in predetermined positions within the valve chamber. The valve chamber includes a wall opening that communicates with a region of the valve chamber above the disc member. The disc member includes an apertured portion for communicating the region of the valve chamber above the disc member with a valving member region defined between the disc member and a base, such that a second flow path is established by the valving member region, the disc member apertures, the valve chamber region above the disc member and the wall opening in the valve chamber. The second flow path is isolated from the first flow path. A movement control member in cooperation with a moveable stop pin establishes four different ranges of motion for the valving member in order to establish four different flow configurations for the control valve.



**Published:**

- with international search report
- before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments

*For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.*

**(88) Date of publication of the international search report:**  
19 August 2004

# INTERNATIONAL SEARCH REPORT

International application No.

PCT/US03/34379

## A. CLASSIFICATION OF SUBJECT MATTER

IPC(7) : f16k 11/085  
US CL : 137/625.47; 251/285

According to International Patent Classification (IPC) or to both national classification and IPC

## B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)  
U.S. : 137/625.47; 251/285

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

## C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 6,076,554 A (JENSEN et al) 20 June 2000 (20.06.2000), See Figure 3, elements 32, 36.	1

☐ Further documents are listed in the continuation of Box C.

☐ See patent family annex.

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"P" document published prior to the international filing date but later than the priority date claimed	

Date of the actual completion of the international search

31 May 2004 (31.05.2004)

Date of mailing of the international search report

22 JUN 2004

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